Unit 1: Professional Development III

- Review the expectations of Sussex County Technical School regarding student behavior.

- Establishing the similarities between the professional work-place and the Shop class, through use of the metaphor: *that the shop functions as a "Studio".*

- Review of the expectations of the instructor for conduct of the student in class, and the professional goals and production schedule for the year, and the necessity for developing time-management skills.

- Outline of required readings and project due dates.

- Review of general safety concerns as outlined in Levels 1 and 2.

- Explanation of the Ethics involved in Work-place cooperation and inter-peer relationships, as well as business standards and practices.

- Identify and discuss teacher/student conferencing.

- Identify and discuss components that make effective communication.

- Identify time management skills to increase the effectiveness of learning in the classroom.

Unit 2: Acquisition of Moving Images I

- Review of the camera and its functions as outlined in the Level I and II Curriculum, with particular regard for controlling exposure, shutter speed, focus and focal-length.

- Review proper treatment and care of the camera and any safety issues surrounding its use.

- Review of the creative and technical capabilities of the camera.

- Review of the differences between how the camera perceives information versus how the human eye and brain do.

- Assess the image quality and characteristics displayed on the LCD screen and all subsequent monitors and determine its relationship to the actual information captured to the tape or drive.

- Gain proficiency at "pulling focus" and an understanding of the appropriate times to do so.

- Students differentiate between various capture modes, regarding: compression rates, color spaces, aspect-ratios, pixel values, frame rates, inter-laced versus progressive imagery, and broadcast systems (NTSC, PAL, SECAM and variants).

- Students explore the technical and creative differences and similarities inherent in preparing material for Broadcast vs. Theatrical Screening requirements.

- Acquisition, storage, and processing of raw files.

- Introduction to "black magic" and "red-camera" technologies and how they will affect acquisition and post-production in the very near future.

Unit 3: Acquisition of Sound for Moving Images I

- Students review the process by which sound is captured.
- Students review the history and development of sound recording.
- Students demonstrate proper care of equipment and safety procedures associated with its use.
- Students examine the creative and technical capabilities of sound and its influence on the impact of picture alone.
- Students examine the differences between how the microphone perceives information versus how the human eye and brain do.
- Students demonstrate advanced comprehension of frequency response, dynamic range, equalization and bias issues, compression and expansion, etc..
- Students demonstrate advanced comprehension of types of microphones and their specific purposes and the circumstance in which one type should be used over another.
- Students review advanced comprehension of audio issues inherent in location acquisition.
- Students review advanced comprehension of audio issues inherent in studio acquisition.
- Students review advanced comprehension of Dual-system sound: Capture methods.
- Students review advanced comprehension of Dual-system sound: Syncing methods.
- Students learn to accommodate for various recordings made under a variety of circumstances.

Unit 4: Advanced Lighting Lab I

- Students review comprehension of the three contributions made by lighting to the image making process.
- Students review of 3-Point Lighting Techniques.
- Students review Light Qualities (hard/soft) and how to best achieve them.
- Students demonstrate comprehension of Close-Up portrait techniques, including Broad, Short, Rembrandt, Split and Butterfly, as well as more experimental set-ups.
- Students begin to demonstrate comprehension of background and set/environment lighting.
- Students demonstrate comprehension of "Fixed" studio lighting for Talk and Interview formats, as well as the lighting for the three-camera "live-to tape" format used in narrative television.
- Students practice selecting appropriate lighting designs as suggested by content, mood and atmosphere in single camera set-ups.

- Students review comprehension of manufacturers of lighting equipment and the advantages of selecting the right kit for the project, among them: Arri, Mole-Richardson, Lowell, Smith-Victor etc.
- Students explore the difference between incandescent and florescent lighting systems and the newer forms of LED lighting.
- Introduction to rigging for the studio.
- Students explore Available Light Cinematography and how to control and augment/enhance it.
- Students explore Natural Light Cinematography and how to best work with it.
- Students explore the creative and technical intricacies of Selective Lighting
- Students explore the difficulties of blending daylight and tungsten light when forced to do so.

Unit 5: Pictorial Composition I

- Students undertake an intense study of pictorial composition as it relates to cinema within the 1.33:1, 1.85:1 and 16:9 aspect ratios.
- Students undertake an exploration of principles set forth in Western Composition from the Renaissance to the present day.
- Students explore the Frame and how information is arraigned within it.
- Students explore Space on 3 axes.
- Students explore the impact of the strong diagonal on Composition.
- Students explore the concept of Stability and Stasis in Composition..
- Students explore the concept of Dynamic Kinesis and its impact on Composition.
- Students explore the pictorial result of arranging objects parallel to the picture-plane, which are contained by the frame lines.
- Students explore the pictorial result of arranging objects perpendicular to the picture-plane, which violate the frame lines.
- Students explore the impact of SHAPE on Composition.
- Students explore the impact of LINE on Composition.
- Students explore the impact of MOTION on Composition.
- Students explore the impact of COLOR on Composition.
- Students explore the impact of BRIGHTNESS and CONTRAST on Composition.
- Students explore the use of triangular forms in Composition.
- Students review the use of the "rule of threes" in their compositions.
- Students explore "Camera-Placement" and "Composition".
- Students are responsible for readings on the works of Josef Albers, Johannes Itten, Henry Rankin Poore, Michelangelo Buonarroti, Billy Bitzer and Gregg Toland among others.

- Students undertake the study of the concept of Stability and Stasis taken together with the concept of Dynamic Kinesis and its impact on Composition.

Unit 6: Evolution of the FORMAL Aspects of Cinematic Story-telling I

- Students examine the *shot-equals-scene* aesthetic of the early years of narrative cinema.
- Students examine the beginnings of Analytical Editing and Montage as worked out by D.W. Griffith and Billy Bitzer, and its impact and legacy on the work we produce today.
- Students examine the silent form, and how sound was "shown, conveyed, suggested" in the silent era and its impact and legacy on the work we produce today.
- Examination of Expressionism in the work of F.W. Murnau, Fritz Lange, and Josef von Sternberg, and its impact and legacy on the work we produce today.
- Examination of Russian Avant-Guard as exemplified by Sergei Eisenstein, Dziga Vertov, Lev Kuleshov, and Alexander Dovshenko and its impact and legacy on the work we produce today.
- Examination of French Surrealism as exemplified by Jean Cocteau, Salvador Dali and Luis Bunuel and its impact and legacy on the work we produce today.
- Examination of the impact sound had on the narrative form. Comparing and contrasting Murnau's "The Last Laugh" with "The Lights of New York" and Fritz Lang's "M".
- Students prepare a research paper and a short form film as a summing up of the many formal and thematic developments represented in the above named works and an emphasis on how readily filmmakers today must rely on them...

Unit 7: Screenwriting for Narrative Projects I

- Students explore the Storytellers Art, beginning with research into Aristotle's *Poetics*, the earliest surviving work of dramatic theory. Especially:
- In-depth analysis of PLOT (Story construction)
- In-depth analysis of CHARACTER (Development of personality traits and recognizable human actions and responses to plot stimuli)
- In-depth analysis of THEME, understanding the "CORE" of the story. (The implicit agenda of the storyteller to share these plot-points and characters with his audience)
- In-depth analysis of DIALOGUE (Spoken dialogue or externalized reasoning of characters to advance or examine plot points)
- In-depth analysis of SPECTACLE (Production value, set-design, wardrobe, hair-makeup, effects, etc.)

- Students explore narrative forms as they have been affected by historical developments in the pictorial arts, and such milestones of story-telling as the inventions of the Novel, the Post-Renaissance Theater, The Motion Picture and Video Camera and the News-Media.

- Students explore the similarities and differences between stories as told by Seneca, Shakespeare and Judd Apatow (The Forty-Year-Old Virgin) or similar contemporary comedy.

Unit 8: Advanced Narrative Cinema: Time and Spatial Considerations I
- Exploration of the Linear storytelling form.
- The Beginning, Middle and End. (Intro and Exposition, Character Development, Conflict, Resolution and Denouement.)
- Exploration of Spatial and Temporal relationships. Establishing when and where narrative events are occurring and the relationship between them, including Parallel Editing
- Announcing Time changes effectively, and eloquently.
- Examination of the difference between forward-moving narrative and exposition.
- Introducing sub-plots in the linear context.
- Exploration of the Vertical storytelling form.
- Examination of methods for seamlessly moving between spatial and temporal changes, (including addressing multiple sub-plots) and seamlessly moving between linear and vertical situations.

Unit 9: Advanced Narrative Cinema 2 (1)
- Exploration of the difference between the written and spoken word.
- Students ascertain When to "show it", when to "tell it".
- Juggling/balancing sub-plots and helping the audience keep track of a multitude of characters introduced at different times and under different circumstances.
- The REAL difference between Comedy and Tragedy/Drama explored and dissected.
- Dialogue, real and artificial…when it's need, and when it should never be used.

Unit 10: Working with Actors I
- Exploration of the various techniques for working with both non-experienced and experienced actors.
- Communicating the writer's or director's wishes to the cast to elicit the best performance.
- Conducting a Cast read-through.
- Appropriate use of spontaneity and improvisation.
- Exploiting the difference or similarities between performer and character.
- Arriving at a common understanding of the way the performance ought to play.
- Establishing a common language that actors and non-actors can share with the rest of the crew.

Unit 11: Three-Camera set up for "Live-to-Tape" TV and Cinema I

- Students expand the basics of single camera camera-placement to include multiple simultaneous capture stations and arrive at appropriate lighting-schemes effective on all axes simultaneously, in a *narrative piece*.
- Students expand the basics of single camera camera-placement to include multiple simultaneous capture stations and arrive at appropriate lighting-schemes effective on all axes simultaneously, in a *talk-show*.
- Students are responsible for determining when to cut in a "Live" situation and the implementation of live edits on a switcher.
- Review the MIXER, its functions and capabilities.
- Review wireless transmissions between mixer/director and members of the camera and sound departments.
- Review of the Audio Board
- Review using the Oscilloscope, and balancing the 3 cameras, including gain, white balance, color matching, exposure and image quality.
- Students are responsible for selecting correct microphones for the shooting environment, setting them properly, performing sound checks and monitoring levels throughout the shoot.
- Students produce a "Live-to Tape" show in real time for peer review.

Unit 12: Documentary I

- Students explore the documentary by examining the work of past masters of the form.
- Through research, student arrives at an understanding of the documentary form and how it differs from narrative filmmaking.
- Students begin pre-production on a documentary project, including researching the subject, and locating artifacts and persons who may have information regarding him/her/it.
- Students research legal and copyright issues surrounding the subject.
- Students research ethics, "fair portrayal" and liable issues.
- The peculiarities of location sound, camera and lighting in the uncontrolled environment of the documentary are explored.
- The Concept of "A" and "B" rolls is examined.

Unit 13: Interview I

- Students explore the Interview form and other ENG formats by examining the work of past masters of the form.

Unit 14: Complete Pre-Production Workshop I

- Interviewing and hiring the Line-Producer.
- Assembling the team.
- Casting and working with the Casting Director.
- Selecting the Director of Photography.

Unit 15: Complete Production Workshop I

- Establishing Control of the Set.
- "Saving the Day" (dealing with unforeseen circumstances of weather, absenteeism, crew morale etc.)
- Effectively Scheduling Locations, Schedules, Transportation and Craft Services, Meals etc.
- Insurance.
- Politics of shooting on location. How to appease, placate the owners of the facilities in which you are working.

Unit 16: Complete Post-Production I

- Reviewing Dailies and selecting takes
- Synching selects.
- Beginning the Assembly edit with an assistant editor
- Fine Cutting
- Allowing for Pick-Ups
- Visual Effects
- Animation
- Titling
- Sound Design
- Scoring original music
- Acquiring Rights to existing music
- Color Timing and uniform exposure compensation
- Conforming to Venue Specs and Quality Control

Unit 17: Third and Fourth Level Long-Form Project I

In preparation for each student's final long-form project in their 4th year, students must consciously pursue the pertinent knowledge necessary for this project in their 3rd Level of the Cinematography & Film/Video Production course of study.

- Students explore the technical and creative differences and similarities inherent in preparing material for Broadcast vs. Theatrical Screening requirements.

NJ Learning Standard 9.3

CONTENT AREA:	STANDARD 9.3 CAREER AND TECHNICAL EDUCATION
ARTS, A/V TECHNOLOGY & COMMUNICATIONS CAREER CLUSTER®	
Number	Standard Statement
By the end of Grade 12, Career and Technical Education Program completers will be able to:	
CAREER CLUSTER®:	ARTS, A/V TECHNOLOGY & COMMUNICATIONS (AR)
PATHWAY:	A/V TECHNOLOGY & FILM (AR-AV)
9.3.12.AR-AV.1	Describe the history, terminology, occupations and value of audio, video and film technology.
9.3.12.AR-AV.2	Demonstrate the use of basic tools and equipment used in audio, video and film production.
9.3.12.AR-AV.3	Demonstrate technical support skills for audio, video and/or film productions.
9.3.12.AR-AV.4	Design an audio, video and/or film production.